WHAT IS CLAIMED IS:

1. A composition for the oxidation dyeing of keratin fibers, comprising, in an appropriate dyeing medium:

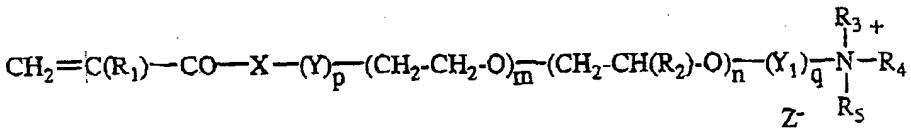
at least one oxidation dye,

at least one fatty acid chosen from C_{10}-C_{14} fatty acids, and

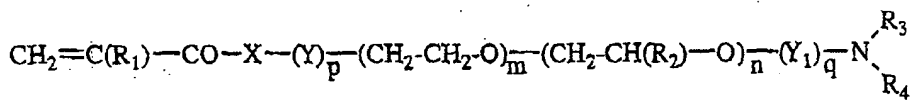
at least one cationic poly(vinyllactam) polymer comprising:

- at least one monomer (a) chosen from vinyllactam and alkylvinyllactam monomers and

- at least one monomer (b) chosen from monomers having the following structures (Ia) and (Ib):



(Ia)



(Ib)

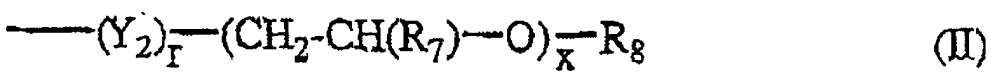
wherein:

- X is chosen from an oxygen atom and radicals NR_6,

- R_1 and R_6, which may be identical or different, are each chosen from a hydrogen atom and linear and branched C_1-C_5 alkyl radicals,

- R_2 is chosen from linear and branched C_1-C_4 alkyl radicals,

- R_3, R_4 and R_5, which may be identical or different, are each chosen from a hydrogen atom, linear and branched C_1-C_{30} alkyl radicals and radicals of formula (II):



(II)

wherein

- Y, Y_1 and Y_2, which may be identical or different, are each chosen from linear and branched C_2-C_{16} alkylene radicals,

- R_7 is chosen from a hydrogen atom, linear and branched C_1-C_4 alkyl radicals and linear and branched C_1-C_4 hydroxyalkyl radicals,

- R_8 is chosen from a hydrogen atom and linear and branched C_1-C_{30} alkyl radicals,

- p, q and r, which may be identical or different, are each integers equal to either the value zero, or the value 1,

- m and n, which may be identical or different, are each integers ranging from 0 to 100,

- x is an integer ranging from 1 to 100, and

- Z^- is chosen from organic and inorganic acid anions, provided that:

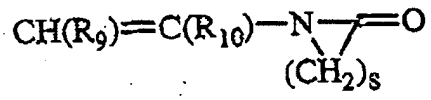
- at least one of the substituents R_3, R_4, R_5 or R_8, is chosen from linear and branched C_9-C_{30} alkyl radicals,

- if m or n is different from zero, then q is equal to 1, and

- if m or n are equal to zero, then p or q is equal to 0.

2. The composition according to Claim 1, wherein the keratin fibers are hair.

3. The composition according to Claim 1, wherein the at least one monomer chosen from vinyllactam and alkylvinyllactam monomers is a compound having the structure (III):



(III)

wherein:

- s is an integer ranging from 3 to 6,

- R_9 is chosen from a hydrogen atom and C_1-C_5 alkyl radicals, and

- R_{10} is chosen from a hydrogen atom and C_1-C_5 alkyl radicals, provided that at least one of the radicals R_9 and R_{10} is a hydrogen atom.

4. The composition according to Claim 3, wherein the at least one monomer of formula (III) is vinylpyrrolidone.

5. The composition according to Claim 1, wherein, in formulae (Ia) or (Ib), the radicals R_3, R_4 and R_5, which may be identical or different, are each chosen from a hydrogen atom and linear and branched C_1-C_{30} alkyl radicals.

6. The composition according to Claim 1, wherein the at least one monomer (b) is chosen from monomers of formula (Ia).

7. The composition according to Claim 6, wherein, in formula (Ia), m and n are equal to zero.

8. The composition according to Claim 1, wherein the counterion Z^- of the monomers of formula (Ia) is chosen from halide ions, phosphate ions, a metho-sulphate ion and a tosylate ion.

9. The composition according to Claim 1, wherein the at least one cationic poly(vinyllactam) polymer comprises at least one additional monomer chosen from cationic and nonionic monomers.

10. The composition according to Claim 9, wherein the at least one cationic poly(vinyllactam) is a terpolymer comprising:

- (i) at least one monomer of formula (III),

- (ii) at least one monomer of formula (Ia) wherein p = 1, q = 0, R_3 and R_4, which may be identical or different, are each chosen from a hydrogen atom and C_1-C_5 alkyl radicals and R_5 is chosen from C_9-C_{24} alkyl radicals, and

- (iii) at least one monomer of formula (Ib) wherein R_3 and R_4, which may be identical or different, are each chosen from a hydrogen atom and C_1-C_5 alkyl radicals.

11. The composition according to Claim 10, wherein the terpolymer comprises, by weight, 40 to 95% of monomer (i), 0.25 to 50% of monomer (ii), and 0.1 to 55% of monomer (iii).

12. The composition according to Claim 1, wherein the at least one cationic poly(vinyllactam) is chosen from following terpolymers:

vinylpyrrolidone/dimethylaminopropylmethacrylamide/dodecyldimethylmethacryl amidopropylammonium tosylate,

vinylpyrrolidone/dimethylaminopropylmethacrylamide/cocoyldimethyl-methacrylamidopropylammonium tosylate,

vinylpyrrolidone/dimethylaminopropylmethacrylamide/lauryl-dimethylmethacrylamidopropylammonium tosylate and

vinylpyrrolidone/dimethylaminopropylmethacrylamide/lauryl-dimethylmethacrylamidopropylammonium chloride.

13. The composition according to Claim 1, wherein the weight-average molecular mass of the at least one cationic poly(vinyllactam) ranges from 500 to 20 000 000.

14. The composition according to Claim 13, wherein the weight-average molecular mass of the at least one cationic poly(vinyllactam) ranges from 200 000 to 2 000 000.

15. The composition according to Claim 14, wherein the weight-average molecular mass of the at least one cationic poly(vinyllactam) ranges from 400 000 to 800 000.

16. The composition according to Claim 1, wherein the at least one cationic poly(vinyllactam) is present in an amount ranging from 0.01 to 10% by weight, relative to the total weight of the composition.

17. The composition according to Claim 16, wherein the at least one cationic poly(vinyllactam) is present in an amount ranging from 0.1 to 5% by weight, relative to the total weight of the composition.

18. The composition according to Claim 1, wherein the at least one fatty acid chosen from C_{10}-C_{14} fatty acids is chosen from capric, lauric and myristic acids.

19. The composition according to Claim 18, wherein the at least one fatty acid chosen from C_{10}-C_{14} fatty acids is lauric acid.

20. The composition according to Claim 1, wherein the at least one fatty acid chosen from C_{10}-C_{14} fatty acids is present in an amount ranging from 0.1 to 40% by weight, relative to the total weight of the composition.

21. The composition according to Claim 20, wherein the at least one fatty acid chosen from C_{10}-C_{14} fatty acids is present in an amount ranging from 2 to 25% by weight, relative to the total weight of the composition.

22. The composition according to Claim 21, wherein the at least one fatty acid chosen from C_{10}-C_{14} fatty acids is present in an amount ranging from 5 to 20% by weight, relative to the total weight of the composition.

23. The composition according to Claim 1, further comprising at least one oxidation dye chosen from oxidation bases and couplers.

24. The composition according to Claim 23, wherein said at least one oxidation dye is chosen from at least one oxidation base.

25. The composition according to Claim 24, wherein the at least one oxidation base is chosen from para-phenylenediamines, double bases, ortho- and para-aminophenols, and heterocyclic bases, and the acid addition salts thereof.

26. The composition according to Claim 24, wherein the at least one oxidation base is present in an amount ranging from 0.0005 to 20% by weight, relative to the total weight of the composition.

27. The composition according to Claim 23, wherein the at least one oxidation dye is chosen from at least one coupler.

28. The composition according to Claim 27, wherein the at least one coupler is chosen from meta-phenylenediamines, meta-aminophenols, meta-diphenols, heterocyclic couplers, and the acid addition salts thereof.

29. The composition according to Claim 28, wherein the at least one coupler is present in an amount ranging from 0.0001 to 20% by weight, relative to the total weight of the composition.

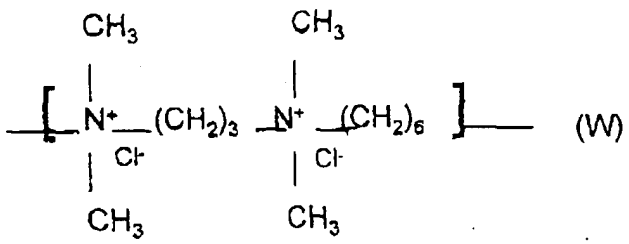
30. The composition according to Claim 25, wherein the acid addition salts of the at least one oxidation base are chosen from hydrochlorides, hydrobromides, sulphates, tartrates, lactates and acetates.

31. The composition according to Claim 28, wherein the acid addition salts of the at least one coupler are chosen from hydrochlorides, hydrobromides, sulphates, tartrates, lactates and acetates.

32. The composition according to Claim 1, further comprising at least one direct dye.

33. The composition according to Claim 1, further comprising at least one additional polymer chosen from at least one amphoteric polymer and at least one additional cationic polymer different from the at least one cationic poly(vinyllactam).

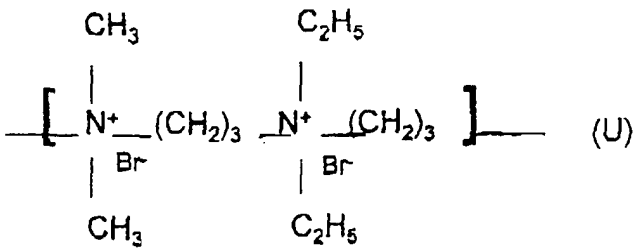
34. The composition according to Claim 33, wherein the at least one additional cationic polymer is chosen from quaternary polyammonium polymers comprising recurring units corresponding to the following formula (W):



(W)

35. The composition according to Claim 33, wherein the at least one additional cationic polymer is chosen from quaternary polyammonium polymers

comprising recurring units corresponding to the following formula (U):



(U)

36. The composition according to Claim 33, wherein the at least one amphoteric polymer is a copolymer chosen from monomers of at least one acrylic acid and at least one salt of dimethyldiallylammonium.

37. The composition according to Claim 33, wherein the at least one additional polymer is present in an amount ranging from 0.01% to 10% by weight, relative to the total weight of the composition.

38. The composition according to Claim 37, wherein the at least one additional polymer is present in an amount ranging from 0.05% to 5% by weight, relative to the total weight of the composition.

39. The composition according to Claim 38, wherein the at least one additional polymer is present in an amount ranging from 0.1% to 3% by weight, of the total weight of the composition.

40. The composition according to Claim 1, further comprising at least one surfactant chosen from anionic, cationic, nonionic and amphoteric surfactants.

41. The composition according to Claim 40, wherein the at least one surfactant is present in an amount ranging from 0.01 to 40% by weight, relative to the total weight of the composition.

42. The composition according to Claim 41, wherein the at least one surfactant is present in an amount ranging from 0.5 to 30% by weight, relative to the total weight of the composition.

43. The composition according to Claim 1, further comprising at least one thickening agent.

44. The composition according to Claim 1, further comprising at least one reducing agent present in an amount ranging from 0.05 to 3% by weight, relative to the total weight of the composition.

45. The composition according to Claim 1, further comprising at least one oxidizing agent, wherein the composition is ready-for-use.

46. The composition according to Claim 45, wherein the at least one oxidizing agent is chosen from hydrogen peroxide, urea peroxide, alkali metal bromates or ferricyanides, persalts, oxidation-reduction enzymes optionally with their respective donor or cofactor.

47. The composition according to Claim 46, wherein the at least one oxidizing agent is hydrogen peroxide.

48. The composition according to Claim 46, wherein the at least one oxidizing agent is a hydrogen peroxide solution whose titre ranges from 1 to 40 volumes.

49. The composition according to Claim 45, wherein the pH of the ready-to-use composition ranges from 4 to 11.

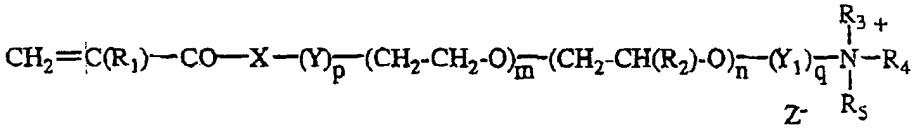
50. A method for dyeing keratin fibers, comprising:

- applying to the fibers at least one composition A comprising, in an appropriate dyeing medium, at least one oxidation dye,

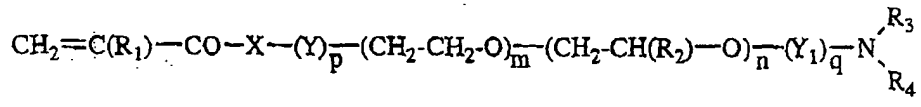
- developing the color at alkaline, neutral or acidic pH with the aid of at least one composition B comprising at least one oxidizing agent, which is mixed just at the time of use with the at least one composition A or which is applied sequentially without intermediate rinsing, wherein at least one fatty acid chosen from C_{10}-C_{14} fatty acids is present in the at least one composition A and/or in the at least one composition B and at least one cationic poly(vinyllactam) polymer is present in the at least one composition A and/or in the at least one composition B, and wherein the at least one cationic poly(vinyllactam) comprises

- at least one monomer (a) chosen from vinyllactam and alkylvinyllactam monomers and

- at least one monomer (b) chosen from monomers having the following structures (Ia) and (Ib):



(Ia)



(Ib)

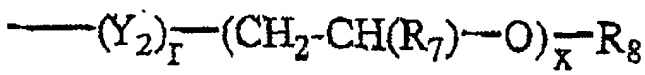
wherein:

- X is chosen from an oxygen atom and radicals NR_6,

- R_1 and R_6, which may be identical or different, are each chosen from a hydrogen atom and linear and branched C_1-C_5 alkyl radicals,

- R_2 is chosen from linear and branched C_1-C_4 alkyl radicals,

- R_3, R_4 and R_5, which may be identical or different, are each chosen from a hydrogen atom, linear and branched C_1-C_{30} alkyl radicals and radicals of formula (II):



(II)

wherein, Y, Y_1 and Y_2, which may be identical or different, are each chosen from linear and branched C_2-C_{16} alkylene radicals,

- R_7 is chosen from a hydrogen atom, linear and branched C_1-C_4 alkyl radicals and linear and branched C_1-C_4 hydroxyalkyl radicals,

- R_8 is chosen from a hydrogen atom and linear and branched C_1-C_{30} alkyl radicals,

- p, q and r, which may be identical or different, are each integers equal to either the value zero, or the value 1,

- m and n, which may be identical or different, are each integers ranging from 0 to 100,

- x is an integer ranging from 1 to 100, and

- Z^- is chosen from organic and inorganic acid anions, provided that:

  - at least one of the substituents R_3, R_4, R_5 or R_8, is chosen from linear and branched C_9-C_{30} alkyl radicals,

  - if m or n is different from zero, then q is equal to 1, and

- if m or n are equal to zero, then p or q is equal to 0.

51. The method according to Claim 50, wherein the keratin fibers are hair.

52. The method according to Claim 50, further comprising

- applying the ready-to-use composition, freshly prepared at the time of use from the compositions (A) and (B), to the dry or wet keratin fibers,

- allowing the ready-to-use composition to act for an exposure time ranging from 1 to 60 minutes,

- rinsing the fibers, optionally washing the fibers with shampoo, rinsing the fibers again, and drying the fibers.

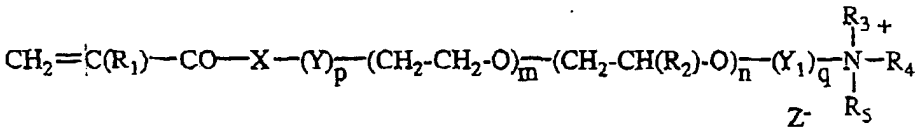
53. A two-compartment device for dyeing keratin fibers comprising:

- one compartment comprising at least one composition A1 comprising, in an appropriate dyeing medium, at least one oxidation dye, and

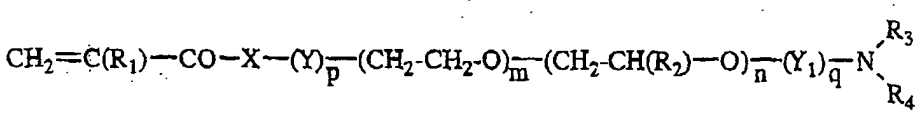
- a second compartment comprising at least one composition B1 comprising, in an appropriate dyeing medium, at least oxidizing agent, wherein at least one cationic poly(vinyllactam) is present in the at least one composition A1 and/or the at least one composition B1 and at least one fatty acid chosen from C_{10}-C_{14} fatty acids is present in the at least one composition A1 and/or the at least one composition B1, and wherein the at least one cationic poly(vinyllactam) comprises

- at least one monomer (a) chosen from vinyllactam and alkylvinyllactam monomers and

- at least one monomer (b) chosen from monomers having the following structures (Ia) and (Ib):



(Ia)



(Ib)

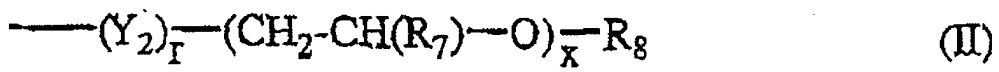
wherein:

- X is chosen from an oxygen atom and radicals NR_6,

- R_1 and R_6, which may be identical or different, are each chosen from a hydrogen atom and linear and branched C_1-C_5 alkyl radicals,

- R_2 is chosen from linear and branched C_1-C_4 alkyl radicals,

- R_3, R_4 and R_5, which may be identical or different, are each chosen from a hydrogen atom, linear and branched C_1-C_{30} alkyl radicals and radicals of formula (II):



(II)

wherein, Y, Y_1 and Y_2, which may be identical or different, are each chosen from linear and branched C_2-C_{16} alkylene radicals,

- R_7 is chosen from a hydrogen atom, linear and branched C_1-C_4 alkyl radicals and linear and branched C_1-C_4 hydroxyalkyl radicals,

- R_8 is chosen from a hydrogen atom and linear and branched C_1-C_{30} alkyl radicals,

- p, q and r, which may be identical or different, are each integers equal to either the value zero, or the value 1,

- m and n, which may be identical or different, are each integers ranging from 0 to 100,

- x is an integer ranging from 1 to 100, and

- Z^- is chosen from organic and inorganic acid anions, provided that:

- at least one of the substituents R_3, R_4, R_5 or R_8, is chosen from linear and branched C_9-C_{30} alkyl radicals,

- if m or n is different from zero, then q is equal to 1, and

- if m or n are equal to zero, then p or q is equal to 0.

54. The device according to Claim 53, wherein the keratin fibers are hair.

55. A three-compartment device for dyeing keratin fibers comprising

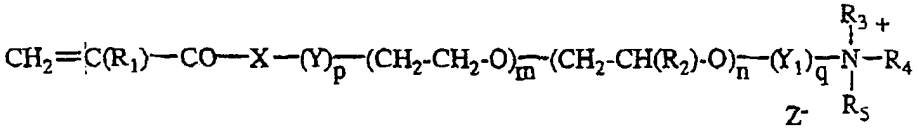
- a first compartment comprising at least one composition A2 comprising, in an appropriate dyeing medium, at least one oxidation dye,

- a second compartment comprising at least one composition B2 comprising, in an appropriate dyeing medium, at least one oxidizing agent, and

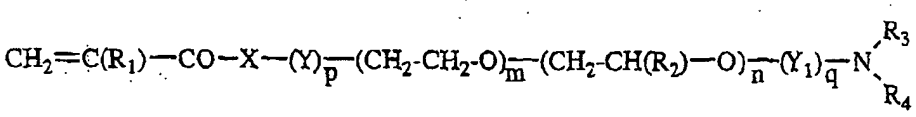
- a third compartment comprising at least one composition C comprising, in an appropriate dyeing medium, at least one cationic poly(vinyllactam) comprising

- at least one monomer (a) chosen from vinyllactam and alkylvinyllactam monomers and

- at least one monomer (b) chosen from monomers having the following structures (Ia) and (Ib):



(Ia)



(Ib)

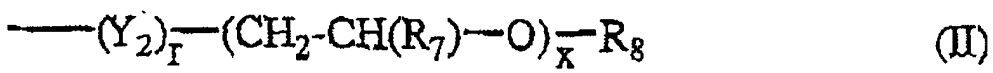
wherein:

- X is chosen from an oxygen atom and radicals NR_6,

- R_1 and R_6, which may be identical or different, are each chosen from a hydrogen atom and linear and branched C_1-C_5 alkyl radicals,

- R_2 is chosen from linear and branched C_1-C_4 alkyl radicals,

- R_3, R_4 and R_5, which may be identical or different, are each chosen from a hydrogen atom, linear and branched C_1-C_{30} alkyl radicals and radicals of formula (II):



(II)

wherein, Y, Y_1 and Y_2, which may be identical or different, are each chosen from linear and branched C_2-C_{16} alkylene radicals,

- R_7 is chosen from a hydrogen atom, linear and branched C_1-C_4 alkyl radicals and linear and branched C_1-C_4 hydroxyalkyl radicals,

- R_8 is chosen from a hydrogen atom and linear and branched C_1-C_{30} alkyl radicals,

- p, q and r, which may be identical or different, are each integers equal to either the value zero, or the value 1,

- m and n, which may be identical or different, are each integers ranging from 0 to 100,

- x is an integer ranging from 1 to 100, and

- Z^- is chosen from organic and inorganic acid anions, provided that:

- at least one of the substituents R_3, R_4, R_5 or R_8, is chosen from linear and branched C_9-C_{30} alkyl radicals,

- if m or n is different from zero, then q is equal to 1, and

- if m or n are equal to zero, then p or q is equal to 0, it being also possible for the at least one composition A2 and/or the at least one composition B2 to comprise the at least one cationic poly(vinyllactam) and it being also possible for the composition C to comprise at least one fatty acid chosen from C_{10}-C_{14} fatty acids.

56. The kit according to Claim 55, wherein the keratin fibers are hair.